

Environmental Results Program (ERP) Autobody Refinishing Shops Project



There are an estimated 13,000 autobody shops in Indiana, Illinois, Michigan, Minnesota, Ohio, and Wisconsin (the Region 5 states). These facilities became subject to a new rule promulgated by the US Environmental Protection Agency (EPA) in 2008 called the National Emission Standards for Hazardous Air Pollutants (NESHAP) for Paint Stripping and Miscellaneous Surface Coating at Area Sources (40 CFR Part 63 Subpart HHHHHH, better known as 6H). The main purpose of this rule is to reduce releases of chromium, lead, manganese, nickel and cadmium from spray coating vehicles and other metal and plastic parts, and methylene chloride from paint stripping.

In the NESHAP preamble, EPA states that compliance will largely rely on the outreach and compliance assistance efforts of state Small Business Environmental Assistance Programs (SBEAPs). When considering how to work with autobody shops, the SBEAPs in the Region 5 states determined that the traditional system of writing permits for each shop and conducting on-site inspections to assess compliance would not be feasible given the states and EPA resource constraints. They also understood that most autobody shops are small businesses, and their owners would not have the legal or technical training to understand the new regulatory requirements and what they need to do to comply with them. They believed that shops would not achieve emissions reductions without an effort to help them understand the requirements in the rule and how to comply.

What is ERP?

An **Environmental Results Project (ERP)** is an innovative method for monitoring compliance and improving environmental performance of selected business sectors that integrates:

- **Compliance assistance** – provides information that clearly explains the regulatory requirements; develops customized solutions for the targeted business sector; trains the businesses on the rules and best management practices.
- **Self-certification** – helps businesses evaluate their environmental performance by conducting self-assessments and certifying compliance.
- **Inspections and enforcement** – measures progress on key performance indicators by conducting inspections before (baseline) and after (post-certification) compliance assistance and self-assessment. The baseline and post-certification inspection locations are randomly selected using statistical sampling procedures. Randomizing inspections facilitates the statistical analysis of the results so they can be generalized to show sector-wide performance.

State agencies use **ERP's** statistical approach to leverage their limited resources by: assessing sector-wide compliance, identifying compliance deficiencies, and targeting assistance, inspection and enforcement activities. Business sectors targeted in an **ERP** can save money by participating in the assistance activities so that they develop a good understanding of the compliance requirements and best management practices.

The SBEAPs in the Region 5 states decided to work together to develop a way to reach thousands of small businesses affected by the new NESHAP using the few staff available in each program. The conversations among the state programs led them to develop the Region 5 States Environmental Results Program (ERP) for Autobody Refinishing Shops Project to demonstrate:

- A strategy for improving compliance at autobody shops across the region;
- The benefits of SBEAP programs in a region working together to implement a program; and
- The effectiveness of a partnership among state programs and EPA in reaching small businesses.

Autobody ERP Project

The SBEAPs in Illinois, Indiana, Michigan, Minnesota, Ohio, and Wisconsin joined together with Region 5 EPA to share resources and implement an ERP for autobody shops in urban counties from 2010 - 2013. The Project involved a number of steps, including:

- Development of a single inspection checklist and a common understanding of how to interpret each element at a shop, so all shops would be evaluated using the same criteria. While the checklist focused primarily on 6H requirements, it also included waste and wastewater management, state-specific air rules, and energy efficiency and pollution prevention measures.
- Visits by SBEAP staff to a randomly-selected group of shops before the rule's compliance deadline measured baseline performance. SBEAPs then used the results

to identify areas of compliance that needed attention and planned their training and other outreach activities.

- Training workshops for the shops, widespread dissemination of compliance assistance materials and a self-certification checklist, and a regional project webpage:
<http://dnr.wi.gov/topic/compassist/sb/autobody.html>. The self-certification checklist described how to comply with the NESHAP and provided guidance on basic waste and water requirements and best practices in energy efficiency and pollution prevention.
- Inspections by EPA Region 5 air enforcement staff at another randomly-selected sample of shops after the compliance deadline to assess compliance rates with 6H requirements only.
- Statistical analyses of the data generated from the visits to compare pre-assistance and post-assistance performance of the shops in areas related to the NESHAP, and a Report on the results. The Project Report is available at:
<http://dnr.wi.gov/topic/CompAssist/sb/ERP.html>.

EPA provided funding support that was critical to the success of this Project.



State experience has shown that **ERP** can be an efficient and cost effective approach to reaching small businesses and improving their compliance and environmental performance. The other benefits of an **ERP** include:

- Improved facility accountability reduces the need for resource-intensive enforcement action over the long term;
- Better information for the public and other stakeholders on how well regulators are doing in fostering environmental compliance and performance in target sectors;
- Clearer explanations for facilities about what they must do to comply with the law;
- A level playing field for all facilities in the sector; and
- Measureable environmental improvements in disadvantaged neighborhoods that face multiple environmental and public health threats.

Visit the States **ERP** Consortium website for more information: www.erpstates.org

What is an SBEAP?

State **SBEAPs** are mandated under the federal Clean Air Act of 1990 Title V permit programs. State agencies across the US have implemented the **SBEAP** function in a variety of ways. All of the EPA Region 5 **SBEAPs** offer free and confidential compliance assistance for any small business that is affected by air pollution regulations. They have also taken on the role of providing assistance on other environmental regulations, including waste and water. Assistance provided by these **SBEAPs** includes:

- Toll-free hotlines to respond to questions,
- Fact sheets and other publications provided via mail and the internet,
- Workshops and webinars,
- On-site assessments,
- Completing permit applications and forms, and/or
- Other tasks needed to help a small business comply with environmental rules.

Results

To assess the impact of the project on the compliance of the facilities, the Project team calculated “facility scores” for a set of 14 regulatory compliance questions for the shops visited by the SBEAP staff during the baseline visits and compared them to the scores for the same questions for the facilities inspected by EPA Region 5 staff. The following figures show before and after percentages of inspected facilities with each facility score. A score of 10 means the facility was in compliance with all of the requirements, and a score of 5 means the facility was in compliance with 50 percent of the requirements (i.e., 7 of the 14 questions).

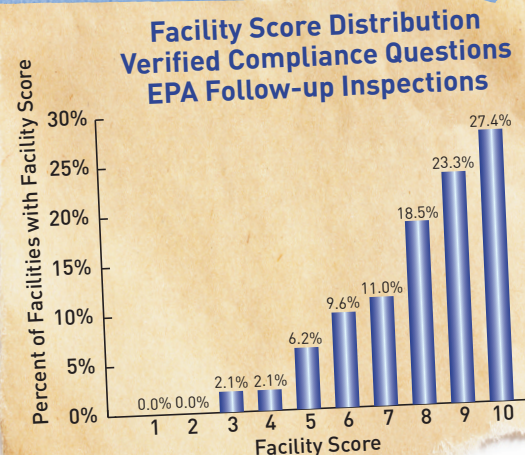
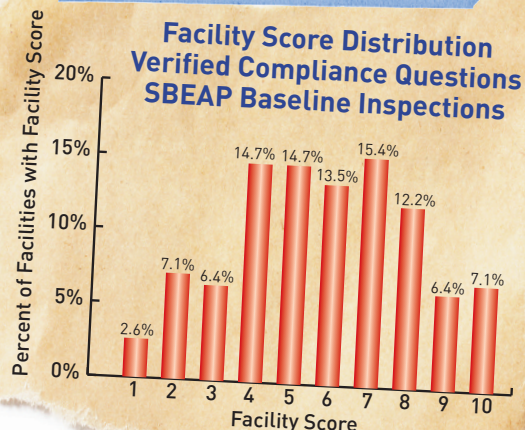
These figures show a statistically significant increase in compliance as a result of the activities undertaken by the SBEAPs during the Project. During baseline inspections, 25.7% of facilities scored 8 or higher, increasing to 69.2% during follow-up visits.

More broadly, out of 25 questions on different aspects of the auto body NESHAP, 18 showed statistically significant improvements, including in the number of shops where:

- No evidence of painting outside of a paint booth was noted;
- Booths and preparation stations met the requirements of the rule with all enclosures ventilated, all exhausts filtered, and all filters meeting the 98 percent collection efficiency standard;
- Painters completed their training and shops had appropriate records on the training;
- Records on methylene chloride in paint strippers were properly maintained; and
- Required initial notification was submitted to regulatory authorities.

The results also identified areas requiring continued improvement, including:

- Painter training requirements;
- Spray booth exhaust and filter system requirements (While these requirements saw statistically significant improvements, the base rates of compliance were low, so many shops still need to upgrade their equipment.);
- Knowledge of coatings used that contain Hazardous Air Pollutants of concern;
- Having only compliant spray guns in shops; and
- Compliance with methylene chloride requirements for the small number of facilities that use it.



Lesson Learned

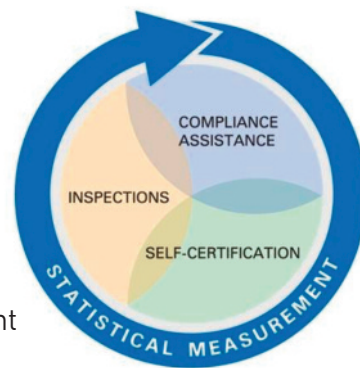
The Project demonstrated the value of ERP as a compliance monitoring approach. The SBEAPs were able to document statistically significant compliance improvements at the autobody shops over a relatively short period of time. The Project also demonstrated that an ERP can be an effective way to provide training and assistance to a large number of newly regulated entities, particularly those that are small businesses.

As a regional partnership, SBEAPs participating in the Project shared the work effort, skills and expertise, and tips on the impact of different outreach tools. This level of coordination created efficiencies, where each program took on a portion of the work and collaborated on the final products. The Project successfully combined efforts across states to reduce the burden on each agency, making compliance assistance and monitoring more efficient than if each SBEAP had to conduct an ERP individually.

The Project also demonstrated that a coordinated effort among SBEAPs and EPA Regional staff can achieve results in improving compliance with air quality requirements and

reduce air emissions from facilities. However, to create a level playing field for shops in the sector and to address areas identified as having lower compliance performance, enforcement follow-up is needed.

For the states in EPA Region 5 to continue to reduce and control air emissions from autobody shops, states and EPA Region 5 could benefit from building on and expanding this ERP initiative. States or EPA Region 5 could conduct additional rounds of randomly-selected follow-up inspections at regular intervals to monitor and assess ongoing compliance. SBEAPs could also encourage the shops to periodically review their self-certification checklists to make sure they remain aware of their compliance obligations. These kinds of measures could help ensure that the compliance gains that autobody shops observed during this Project continue into the future.



Project Team

State	Program	Phone	Website
Illinois	Small Business Environmental Assistance Program	800-252-3998	www.ienconnect.com/enviro
	Illinois Sustainable Technology Center	630-472-5019	www.istc.illinois.edu
Indiana	Compliance and Technical Assistance Program	800-988-7901	www.in.gov/idem/ctap/index.htm
Michigan	Environmental Assistance Program	800-662-9278	www.michigan.gov/deqoea
Minnesota	Small Business Environmental Assistance Program	800-657-3938	www.pca.state.mn.us/sbeap
Ohio	Office of Compliance Assistance and Pollution Prevention	800-329-7518	www.epa.ohio.gov/ocapp
Wisconsin	Small Business Clean Air Assistance Program	855-889-3021	dnr.wi.gov/topic/CompAssist/sb/
	Northeast Waste Management Officials' Association	617-367-8558	www.newmoa.org
	EPA Region 5 – Rae Trine	312-353-9228	http://www2.epa.gov/aboutepa/epa-region-5

Region 5 States



States ERP Consortium